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FROM FRESNO TO MT. WHITNEY BY WAY OF ROARING (OR CLOUDY) RIVER.

BY HOWARD LONGLEY.

One Tuesday evening, early in August of last year, M. R. Madary and wife, of Fresno, James Ostler, of Mendocino, Frank G. Henderson and the writer, both of Los Angeles, were encamped in Horse Corral Meadows, *en route* to Mt. Whitney. A team had brought us from Fresno, by way of Squaw Valley and Boren's, to Moore & Smith's Mills, alongside of the General Grant National Park; and the cool shade and luxuriant verdure of the park seemed delightful after the hot, dusty, and barren plains and foothills we had been crossing. The journey from the mills to Horse Corral Meadows, about twenty-two miles, was easily made in a day.

Having originally contemplated a trip for rest and pleasure, we had along a folding table, chairs, hammocks, and other *et ceteras* of camp luxury, together with a large number of animals to carry the equipage and ourselves from place to place. Notwithstanding these encumbrances, we determined to seek a new and shorter route to Mt. Whitney; and we outlined it as follows: To Sugar Loaf Creek; down that to Roaring River; up that stream, and across the divide just south of Mt. Brewer into one of the tributaries of Bubb's Creek; up it, and again over the crest

to the head-waters of the Kern, and thence to Crabtree Meadows and Whitney. Having been informed that it was very difficult, if not impossible, to ascend Bubb's Creek from the King's River Cañon with animals, we chose the route above stated. After much exertion, success crowned our efforts; and the thought that a description of this more direct route, over almost virgin country, might interest other lovers of mountain-climbing, prompts this contribution to Sierra Club literature. In apology for the crudeness and incompleteness of the record, it should be stated that at the time of making the trip there was no thought of imparting its results to others, except by means of the photographs taken; hence, but few accurate observations were made.

Instead of continuing on the trail to King's River, therefore, when about half-way the length of Horse Corral Meadows we turned to the right, crossed the meadow, and climbed the divide between Boulder and Sugar Loaf Creeks, winding up around the west and south sides of Lookout Mountain (or Sugar Loaf, as it is called on the Sierra Club map of the King's River country) to a saddle a few hundred feet lower than that mountain, and immediately south of it. Stopping there for lunch, Mr. Henderson and I ascended the peak (about 10,600 feet in elevation) to take a panoramic set of pictures embracing the territory from Mt. Silliman on the south, around east and north to beyond University Peak. A very comprehensive and inspiring view of the Sierra can be obtained from this point, including not only the two mountain masses just mentioned, but also the Kaweah Peaks, Table Mountain, Mt. Brewer, and the cluster guarding King's River Cañon, as well as the many intervening timber-clad ranges.* Descending the eastern slope

* See Plate XXII. View eastward from Lookout Mountain. Mt. Brewer is the cone on the sky-line in the distant center. The dotted line indicates our trail down Sugar Loaf Creek to the left, up Roaring River to the right, and up to Longley's Pass south of Mt. Brewer.



VIEW EASTWARD FROM LOOKOUT MOUNTAIN.

From a photograph by Howard Langley, 1894.



MEADOW NEAR THE HEAD OF ROARING RIVER.

From a photograph by Howard Longley. 1894.

of the mountain, we soon reached Sugar Loaf Creek, and had easy traveling in its company to within a mile or so of its junction with Roaring River, where we camped for the night by a meadow surrounding a sugar-loaf cone. Our courses for the day were first south-east and then north-east.

On Thursday morning, soon after starting, we crossed the creek and neck of land between that and Roaring River, and commenced ascending the latter stream, which, by the way, enjoys the distinction of three names upon as many different maps—Roaring River, Cloudy River, and Cañon Creek. There are no branches which render the way uncertain, unless it be at one place a mile or so above where we first reached it. There we took the main, or eastern, stream; and, if memory serves, about the same time we crossed to the eastern side on a log bridge. The traveling was fine most of the day, and our course was generally southeast. We pitched camp at an elevation of 8800 feet, in a small clump of trees, with the placid stream near by, deviously winding through a beautiful green meadow, while the slightly receding walls on either side rose in silent majesty almost 3000 feet above us.*

On Friday we were nearly ready to resume our journey, when we saw a Portuguese sheep-herder who said it would be impossible to get across the crest by continuing up the main stream; but he thought we could get over into Bubb's Creek through a break in the east wall about a mile below, or, possibly, through one a half-mile above us. We therefore unpacked, and Mr. Madary and I started out to investigate the one ahead, the one seen to the left of the central peak shown in the picture. We succeeded in getting to the top of the cañon wall by a climb of 2700 feet, but found that, even if the animals could be taken there—which was very doubtful,—it would be impossible to cross the divide

* See view in Plate XXIII, looking up Roaring River. Our camp was in the little cluster of trees at the head of the meadow, on the left.

in that direction. Its appearance was much more forbidding than that of the main cañon. So we acted upon the advice of the herder, and moved back half a mile or so, to a small meadow, at the head of which a diminutive stream comes in from the east.

On Saturday morning, having marked a two-foot tamarack with the blaze here shown, we started up the rocky talus on the north side of the branch stream and some two hundred yards above the blaze, our general direction being northeast. After going about a mile and a half, we first reached the edge of the creek whose cañon we were ascending. Not crossing, we traveled up its northern bank for half a mile more; then leaving the stream still on our right, we ascended the rocky wall of the cañon, to get above the bluff in front. We ate lunch in a tamarack grove, at an elevation of 10,750 feet, and probably three miles from Roaring River. Starting on, we climbed a rise to the left of the creek. Before long the stream forked, and, crossing the left-hand (northern) fork, we followed it up to another bench, over a mile from the tamarack grove. Surmounting this, there were seen two more terraces directly ahead. The stream we followed was afterwards found to have its source in a lake a little above the higher of the two terraces. Instead of following the brook farther, we turned to the right and ascended a loose, rocky slide, perhaps 600 feet high. This brought us to a gently ascending swale, perhaps half a mile long. Upon reaching its further end, we had conquered the first divide, and were overlooking Bubb's Creek and the King's River country. We blazed the trail from the point where we left Roaring River until we got above timber-line. This pass was 13,075 feet in elevation, by the barometer. As the writer had been the first to reach its summit, the party concluded to call it Longley's Pass, as a means of identification in the future. The day's work had been very hard, partly

because of the many animals to take care of and the numerous packs to handle. Too tired to attempt the descent of the other side, even if approaching darkness had not forbidden it, we were compelled to spend the night upon this wind-swept pass of rock and snow, with no feed for the animals, nor fuel or shelter for ourselves.

Upon turning out on Sunday morning we found the water in our canteen frozen; so our slight repast was dry as well as uncooked. On the Bubb's Creek side of the saddle lay a narrow bank of snow almost the length of the depression, while immediately below it was a bluff perhaps forty feet high. By using pick and shovel, however, and by taking one animal down at a time, we succeeded in crossing the snowbank at its extreme right or southern end, and in working back to the left, below the snow and along the brow of the cliff, until it merged into a loose, rocky declivity, at the bottom of which was a small snow-pond. At an elevation of 13,000 feet, climbing up and down these few hundred feet to haul the reluctant animals one by one over the snow, along the ledge, and down the slope, rolling rocks out of the way and replacing dislodged packs, was exhausting work; and many a time before everything was safely landed in camp that day did we wish—not that we were elsewhere, but that two-thirds of the luggage and most of the animals were. However, such reflections were not as cheering as something warm to eat; so we skirted the left edge of the pond, then turned southward and zigzagged down to a larger one a short distance below. This we approached at its lower end; but when within a few feet of it, we doubled back and descended a straight, narrow gorge towards another lake. When about half-way down we turned out leftward to a diminutive meadow a couple of hundred yards away, where there was enough wood to cook breakfast. Although our camp here was probably not more than a mile in a direct line from the

summit, it had taken seven hours of hard work to reach it; so breakfast served also for dinner and supper. But the extreme wildness and grandeur of the scenery compensated us for the labor. Immense perpendicular cliffs of huge granite slabs, or sloping glacial-polished walls, were all around us. Fields of snow lay at the shaded bases of precipices, and little patches clung to their narrow ledges; while beautiful Alpine lakes reflected their imprisoning walls at almost every turn of the cañon.

In working down on Monday, we kept along the slope to the left of the stream, and a few hundred feet above the lake,* until we got beyond it; then descended to its edge. It proved to be a twin lake, with a narrow strait. We stopped on the farther side of the lower, smaller portion, in a little grove. The journey had occupied only about three hours; but we were pretty well exhausted from previous exertions, and had hard work ahead,—so a rest of a day and a half was determined upon. Aside from our own desires, this was necessary on account of the animals, which, from the time we left Horse Corral Meadows, had had but scant feed. Meadows were numerous, but the dry season had forced the sheep-herders farther into the mountains than even they had been for several years; and their flocks—so aptly termed by Mr. Muir “mountain locusts”—had cleaned up everything edible. There was a small meadow near camp; but half a mile below was an extensive one, near a larger lake. Even this had been visited by the sheep; but our animals were given forty-eight hours in which to forage as best they could. As for ourselves, the presence of a lady in camp, had rendered the half-soling of our pantaloons an act of discretion,—for frequent tobogganing

* See Plate XXIV, a view taken just below Longley's Pass, looking eastward down a tributary of Bubb's Creek. The sheet of water we called Lake Reflection. Our camp was beyond it, and just behind the left-hand nose of rock. The view in Plate XXV was taken from a point just beyond where the dotted line ceases between the two mountain walls in the center distance of this picture.



BUBBS CREEK CAÑON, FROM LONGLEY'S PASS.

From a photograph by Howard Longley, 1894.



LONGLEY'S PASS AND MT. BREWER.
From a photograph by Howard Longley. 1894.

over rocky slopes had not been conducive to their integrity; while worn out boot-soles and heels were replaced by riveting on a thickness or two of "cinch" belting.

About 2 o'clock Wednesday, being once more in fairly good condition all around, we started up the eastern slope of the cañon, through the timber; and, when pretty well above that, traveled in a southeasterly direction between two granite walls running pretty nearly at right angles with the main cañon; gradually ascending until we reached timber-line, and also the base of a steep ascent of several hundred feet. Here we halted.* Climbing the rise to view our next day's labor, while supper was being prepared, we came to what we feared would prove to be a *cul-de-sac* ahead, a cirque surrounded by granite walls and about half a mile in diameter. In its center was a small lake, surrounded by a very uneven surface, most of it consisting of jagged rocks, with no soil or gravel between them; and the sides were either steep inclines or forbidding cliffs. The prospect was anything but assuring; and our only consolation was the thought that should our efforts of the next day succeed, we should be on the Kern River side of the divide, from whence we knew Whitney could be reached.†

Starting early Thursday, we soon reached the top of the incline, and the commencement of our troubles. The donkeys, incapable of "backing," would become wedged between large rocks, or their feet would slip into crevices and be cut by the sharp edges. Many times it was hard to find

* See Plate XXV, a view looking northeast from an elevation, of about 11,600 feet. The central and largest of the three distant peaks is Mount Brewer. Longley's Pass is on the extreme left of the picture, and beyond it is Roaring River. The branch of Bubb's Creek down which we had come runs in the deep cañon crossing the center of the picture. We had followed it to a point near the right-hand edge of the picture before we turned up the valley in which the picture is taken. Madary's Pass is about one mile behind the location of the camera.

† See Plate XXVI, showing the crest of the divide between Bubb's Creek and Kern River country. Its elevation is about 13,300 feet, and it was named by us Madary's Pass. The camera was pointed southeast. Kern River is on the other side of the bluff in front. We crossed by ascending the second gravelly slope on the left side of the picture; it being about 1000 feet long.

a place where they could step from one rock to the next. It was therefore with difficulty that the animals were got across these few hundred feet at all; and, at best, the task consumed over an hour. Having accomplished that, however, we quickly reached the base of the *débris* slopes, which extended nearly to the tops of the surrounding cliffs; and in one or two instances the cliff had broken away, so that the slide apparently reached the ridge. Selecting the least forbidding gap, we moved up a smoother snow-surface at its side until the steepness became too great, when we resumed the talus. Hardly had we done so before the donkeys began slipping, and it was soon discovered that the *débris* formed but a thin crust over frozen snow, ice, and imbedded rocks. Suddenly one of the animals slipped, rolled over twice, and lodged wrong side up between two rocks. Hastening to it, I heard a shout, and, looking up, saw the donkey that carried my camera come tumbling down, with Henderson tugging at the halter in a vain attempt to save her. Down she came, over and over, until, after five or six revolutions, she succeeded in stopping. Fortunately there were no bones broken; but she had received some bad cuts, and blood was flowing from a dozen wounds. We had divided the packs that morning, giving part to the saddle-animals; so all she had was a camera-box on top, with an abundance of bedding underneath and in the saddle-bags at her sides. Had it not been for these cushions to light upon, she must have been killed. They also saved the photographic outfit from anything more than slight injuries. Madary and Ostler, leading the two horses some distance in advance, kept on until they reached a mass of snow-ice extending across the narrow gorge. Slanting up its face from one side to the other, was a ledge, worn by water from the melting ice. The upper end of the ledge extended practically to the summit, and afforded the only chance of getting up. So they started to cross it. When about

half-way, one of the horses slipped and fell, part of his body hanging over the ledge. Had he overbalanced, he would have gone tumbling down the gorge to certain destruction, and would have swept with him at least two of the pack-animals in the path below, and possibly Henderson. Hastening to their assistance, we cut the cinches and relieved "Billy" of his pack; and then, by climbing to the summit ourselves, and using long ropes, we finally got him to the top and to safety. The remaining animals were placed out of the way of falling stones, and work was commenced with pick, shovel, and ax, to make the ascent possible. As an additional inducement to exertion, a cold wind soon brought sleet and snow. Finally the animals, practically unloaded, were got to the edge of the ice, where each was tied to a rope and dragged to the top. Even then most of the luggage was below, to be brought up on our own backs; and as the footing gave way at every step, this was no easy task. At last, after ten hours' hard labor, all the animals and most of the baggage were on the summit, not over a mile from our previous camp, and only 1600 feet higher. But what a pleased, though weary, sigh of relief came from our party! Our labors had not been in vain! We had twice crossed the crest of the Sierra, had found a much shorter way to Mt. Whitney, and were at last on the Kern side of the divide. Mr. Madary had come from the other side as far as this pass two years before, when trying to get from Mt. Whitney to King's River; and so it was called Madary's Pass. Its altitude is about 13,200 feet. From here he knew the traveling would be comparatively easy, in a direction approximately southeast, until the Mt. Tyndall fork of the Kern River was reached. For the first few miles the country was rather broken, with a number of lakes scattered along, and much rougher in appearance than the traveling was actually found to be. After that, it was hardly more than rolling in its nature, with a gentle slope south-

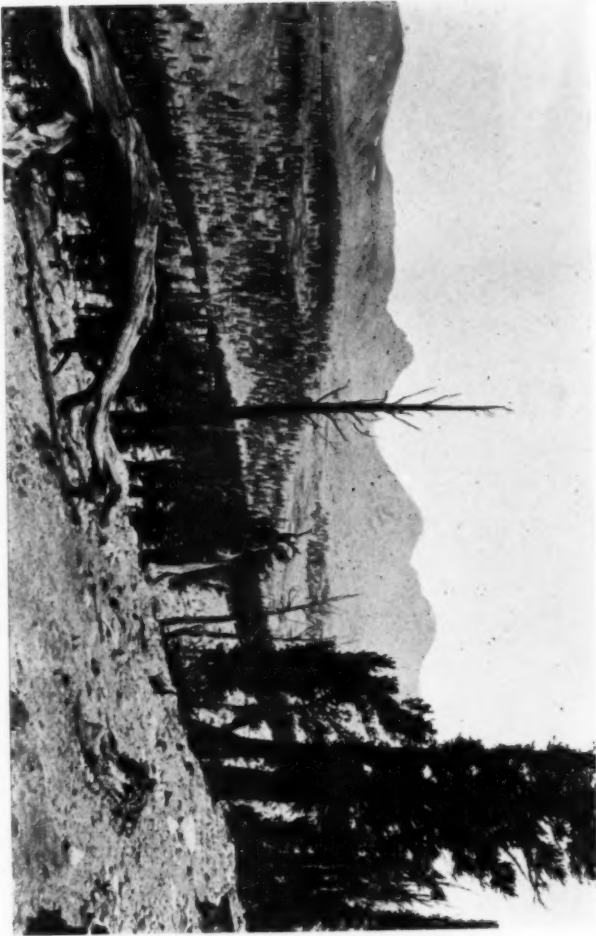
ward. My two forty-pound boxes of plates, the box of crackers, and the tableware were still part way down the hill; but it was half-past six, and we had to hurry onward. Night soon obscured everything; but we stumbled along on our weary way until after nine o'clock. At last, giving up hopes of anything warm for ourselves, we halted where there was some feed for the animals, and dined in the dark on chipped beef, canned plums, and water with a strong flavor of sheep. Throughout the whole trip we were much disappointed to find the otherwise delightful water near the sources of the streams, so unpleasantly flavored by having passed through meadows where the sheep had grazed.

On Friday morning we resumed our search for wood and breakfast. Not a stick was in sight; but two hours' travel brought us to an abundance of fuel, and to the Tyndall fork of the Kern. After a good meal, Henderson and I returned with two animals for the articles we had abandoned the night before, making nearly twice as good time as we previously had made in the dark. Our altitude at this point on the Kern was about 11,200 feet.*

From there our course was nearly south, leaving the stream and climbing the ridge. We had again reached known country, and had trails to follow. With the exception of two or three bothersome moraines, the traveling was very good, and it was a short day's journey to Upper Crabtree Meadows.† From here on the country is, of course, well known to mountaineers, and needs no description at this time. Three of us climbed Mt. Whitney. Mrs. Madary, having made the ascent before, did not go farther than about half-way up the "Angel's Ladder"; while Mr.

* See Plate XXVII, a view looking west of north over our trail from Madary's Pass, the low saddle between the two peaks in the distant center of the picture. Tyndall Creek runs in the depression crossing the picture diagonally to its lower left-hand corner. Mt. Tyndall is beyond the limits of the picture to the right.

† These are one extensive meadow, ramifying irregularly, and the last of any size before reaching Langley Camp, four miles beyond on the way to Mt. Whitney.



TYNDAL CREEK AND MADRY'S PASS.

From a photograph by Howard Longley. 1894.



SUMMIT OF MT. WHITNEY.

From a photograph by Howard Longley. 1894.

Ostler's ambition was not even as aspiring as that. To tell the truth, he had been working incessantly, and was nearly exhausted. The camera was taken to the summit, and some fair photographs secured, although a cloudy day with occasional showers of snow or rain, made them less satisfactory than they might otherwise have been.* We found the Sierra Club register in good condition, and added the statement of our ascent. There was a record of some one—I now forget of whom—who had reached the summit direct from the Owen's Valley side; but who frankly said he never cared to do so again. We returned to civilization by way of Kern River Cañon, Soda Springs, Mineral King, and Visalia, all of which country has been described before.

Loaded down and encumbered as we were, seeking a path through unknown regions, we had come from Horse Corral to Crabtree Meadows in several days of actual travel; while, under favorable conditions, this time could probably be shortened to five days. I do not know how this route compares in time with that *via* Lone Pine and Whitney Meadows; but I imagine that our route has scenery more interesting and grander. The eight or ten miles between the point where Roaring River is left and Madary's Pass, in and out of Bubb's Creek Cañon, is undoubtedly hard traveling; but the rest of the way is about what will ordinarily be met with in the Sierra.

It has been to us a matter of great regret that, when we were so near the head of Roaring River, the attempt was not made to cross the divide between Table Mountain and the unnamed peak just northeast of it, as that route would avoid the region most difficult to traverse, and would save one crossing of the divide. The traveling had theretofore been good. We were within about four miles of the crest

* See Plate XXVIII, showing the Owen's Valley front of the summit of Mt. Whitney.

at this point, and were able to see nearly to the head of the cañon. Part of its bed appeared rough and broken; other portions, good. Whether the crossing of the divide could be accomplished or not was very uncertain; and limited time compelled us to accept the statement of the sheepherder that it was impassable, and to attempt the route he suggested as being feasible. But I shall never be satisfied until this most direct route shall either be traversed or be found impracticable; and, if this point is not sooner determined, some summer will find me wandering again among the crags of the crest of the Sierra. But I shall not be accompanied by twelve animals, camp-chairs, and portable stoves.

March 2, 1895.

THROUGH THE TUOLUMNE CAÑON.

BY R. M. PRICE.

An article on the Grand Cañon of the Tuolumne, printed in the *Sierra Club Bulletin* of January, 1893, seems, contrary to the intention of the writer, to have created an impression that the descent of the cañon is inevitably fraught with great hardship and danger. The trip, though necessitating some privation, in reality presents no greater danger than the mountaineer is likely to meet in the ascent of many of the peaks of the Sierra. Furthermore, in the experience of last summer it was found possible to avoid two or three of the most difficult places encountered in the earlier trip, and further exploration may suggest still further improvements in the route. This article, then, does not presume to instruct the trained mountaineer; nor, on the other hand, does it attempt to indicate a route both clear and easy for the average amateur. It aims rather to give to those somewhat accustomed to rough mountaineering a few general directions, with some occasional detail, concerning what the writer considers the best way to make the trip.

The best time for this expedition is late in July, or, better still, in August. *Lembert's Soda Spring* is a favorite camping-place in the Tuolumne Meadows, just outside of the eastern end of the cañon. It is easily reached by pack-train, over well-known trails, whether from Crocker's, or from the Yosemite Valley. It is, therefore, the natural starting-place for such an expedition. In the way of general directions from this position, nothing better can be

given than what was given the writer by Mr. John Muir, in the spring of 1892: "Don't load yourself down with blankets and gun! Take food enough for three or four days, and saunter down the north side of the river." To many, however, somewhat more detailed suggestion as to preparations and equipment may seem desirable, and to such persons the following remarks may not come amiss.

First in the list of requisites for those who would attempt the descent of the cañon, are good health, sound nerves, and muscular endurance. Food for the journey is the next most important consideration. The object should be to get the maximum of nutriment in the minimum of bulk and weight. Flour, rolled oats, rice, bacon, dried beef, coffee, chocolate, and sugar are good articles to carry. Canned goods are too heavy, and they do not ride well in a knapsack. Enough food for five days should be carried, and, if necessary, it would be better to live on short rations for a day or two, than to be overburdened with provisions. For cooking utensils, take, for a party of three or four, a small frying-pan, a tin pail for cooking rice or mush, a small coffee-pot, and a piece of canvas about two feet square. This last article, fitted in a small hole in the ground, makes an excellent mixing-pan. These things, including the provisions, should be carried in knapsacks attached to the back in such a manner as to keep them from swinging, and from preventing the free use of the arms. The whole weight to be carried need not, and should not, exceed fourteen or fifteen pounds.

Lastly, as to clothing. The shoes or boots should be strong and heavily hobnailed. Without nails in them, one would be at a great disadvantage in walking over the polished rock and in jumping from one boulder to another. If shoes are worn, a pair of heavy leggings of canvas,—or, better still, of leather,—will be found to assist materially in protecting the lower part of the legs from being bruised by

the rocks and brush, and from possible attacks of rattlesnakes, which are quite numerous in the lower part of the cañon. Duck or heavy jean overalls should be worn instead of woolen trousers; for the latter would not last through the second day. A strong flannel shirt would be less cumbersome than a coat. Some of last summer's party found heavy sweaters excellent substitutes for both coats and flannel shirts. Finally, provide yourself with a pair of buckskin gloves; for it less trying to the nerves to wear out buckskin than the ends of your fingers.

With regard to outfit, it only remains to repeat and emphasize Mr. Muir's caution: *Do not attempt to carry blankets, and do not take a gun.* Blankets are too much of a luxury for the Tuolumne Cañon tramping, and he can dispense with them without serious inconvenience. Lying on a bed of fir boughs and brake, between two blazing logs, with naught to shelter him but the starlit dome, he is sung to sleep by the roar of a cataract or the murmuring of the pines, and enjoys a rest known only to the tired mountaineer.

In one's course through the cañon, the northern side seems, as Mr. Muir has said, to afford, in general, the most satisfactory route. There are places where some advantage is to be gained by crossing the river and continuing a short distance on the south side; but this advantage would be offset in most instances by the difficulty of fording. This attempt, except at low water, would be not only difficult, but dangerous. As a general rule, follow the stream closely, and avoid, when possible, the thick brush and the large rocks of the talus.

Last summer's trip was undertaken by Mr. W. S. Brann and the writer, with the intention of marking by blazes the most practicable route through the cañon. At Lumbert's Soda Springs we were met by Messrs. Leon Solomons, E. C. Bonner, and W. E. Colby, who accompanied us through to Hetch Hetchy Valley, and assisted in the work.

After blazing a trail for some miles from the end of the meadows, we found that it would be a useless task to continue indicating the route in this manner throughout the entire length of the cañon; for no one would think of looking for a trail through a small meadow or where the way was plain and the difficulty consisted only in scrambling over the talus or working one's way through the brush. The "blazing" and making little piles of stones were continued only where the trampler would be apt to mistake the most direct course, or when he would be apt to select a direct, but difficult or dangerous, way.

From the end of the meadows for four or five miles, no difficulty whatever will be experienced. The river descends in a series of shelving cascades and silver aprons to Round Valley, which is about a mile from the meadows. Here it makes a bold sweep to the north, and then again to the south, inclosing a round meadow about three-eighths of a mile in diameter. From this point to Conness Creek, which is three or three and one-half miles further down, the river is mostly a series of small cascades. A short distance above the Virginia Creek trail, which follows along the west bank of Conness Creek, there are the Upper and Lower Virginia Falls. A little further on, and just before reaching Conness Creek, is the Tuolumne Fall, where the river makes a perpendicular descent of about seventy-five feet. Part way down the fall the water strikes a projecting rock, and is thrown into a mass of spray and foam.

Almost immediately below where Conness Creek enters the Tuolumne River, are the White Cascades, marvels of beauty, where the river spreads out over a large surface of glacier-polished rock inclined at an angle of twenty-five degrees. Opposite these cascades, there is, on the north wall, a dome of great height; below, there is a small meadow and a grove of aspens and tamarack pines. From Conness Creek to Return Creek, a distance of four or five

miles, the river drops very rapidly, and the scenery becomes more rugged and inspiring, in the magnificent cascades, and in the lofty cliffs and domes. The walls and domes here are at least 2000 feet high; and one dome in particular, a grand structure on the north wall, can not be less than 2500 feet above the river. This dome has a noticeable scar on its southern face, where a huge block of granite has been shaken from its place by some post-glacial earthquake. Opposite this, the river drops about 400 feet in a magnificent cascade. Near here, on the south wall, there are three domes, so like one another in appearance that they might be called "The Three Brothers." It is better to leave the river at the cascades opposite the above-mentioned dome, and continue in a line part way between the river and the cliff. One route along here is as good as another, providing it is maintained at some distance from the river. Coming down to the river again where it passes through a deep gorge, once more leave it, and continue among the rocks and brush for some distance, passing around and to the right of a boulder about forty feet high. Then return to the river, which will be reached where a small portion of the water branches off to the right of the main stream, forming a small wooded island. Continue down this branch, stepping from boulder to boulder nearly to the place where it again meets the main stream; then follow the river closely to the head of a cascade of unrivaled beauty and grandeur. We named it the California Cascade. The distance from the gorge above mentioned to the head of this cascade is not more than one-third of a mile. Here there is a ledge of polished rock extending toward the north wall of the cañon. Walk up this ledge 100 or 125 feet, and then climb down over the rocks and the dry bed of a streamlet to a clump of three or four yellow and sugar pines, quite near the incline down which the river plunges. These trees are plainly blazed. From this point work your way

down away from the river—for here it bends to the south,—and make for a ledge of rock lying at right angles to the general direction of the cañon. The river turns again toward the north, and comes close to the western side of this ledge. From this point there is a grand view down the cañon, where the walls are seen reaching higher and higher toward the sky. Cross this ledge well to the right and gradually approach the river, which can be followed to the head of what is in many respects the most majestic cascade in the whole cañon, the Le Conte Cascade, so named by us in honor of our esteemed Professor, Joseph Le Conte. This cascade is about one-third of a mile from the preceding one. The method of proceeding here is similar to that at the California Cascade. Go immediately from the head of the cascade 250 or 300 feet toward the north wall, and then back gradually downward to a cluster of four or five trees (one is a pine, the others junipers) which are on the edge of the chasm, about half-way down the descent of the cascade. From this point, a magnificent and imposing view of the cascade is obtained. The water dashes 600 or 700 feet down a surface inclined at an angle of 50 or 55 degrees, a mass of foam and spray. At intervals, the formation of the bedrock is such that the water is thrown out in columns fifteen to twenty feet high, and in huge water-wheels of fantastic forms. From the cluster of trees to the foot of the cascade progress is somewhat difficult. It is necessary to work 200 or 300 feet toward the north wall, making use of joints and seams in the rock to keep from slipping on its polished surface; then approach the river, and follow it to Return Creek, which is less than half a mile from the Le Conte Cascade.

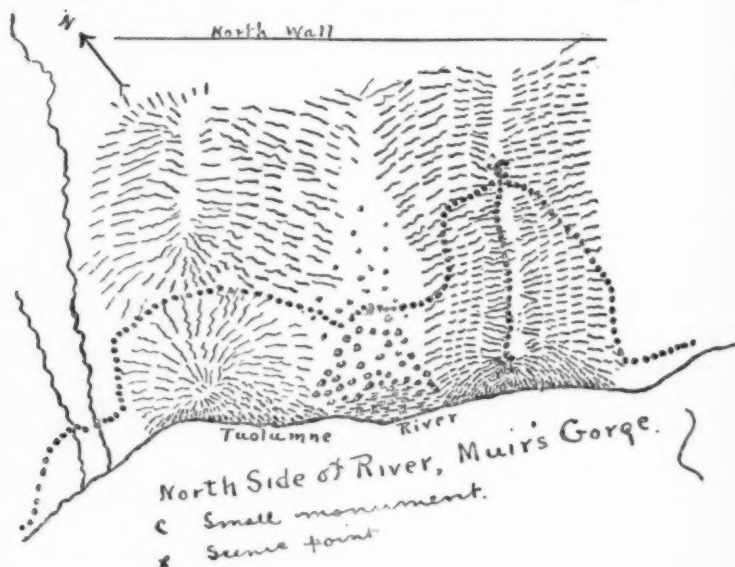
The crossing of Return Creek may occasion some trouble. If the water is low, it may be forded near its mouth, or may be crossed by jumping from boulder to boulder. This last, however, is a rather risky operation;

for one may lose his foothold and be severely tumbled among the bowlders before he can regain his feet or reach the bank. The safer way is to ford the stream near its mouth, holding on by a small rope to keep from being carried off the feet by the swift current. When Return Creek is crossed, follow along the river on the smooth surfaces and over the bowlders. Owing to steep banks and large bowlders, it may be necessary at some places to leave the river and work along through the brush and over the jagged rocks of the talus. From Return Creek to the sheer-walled gorge no specific directions can be given, nor are they necessary; for no difficulty will be experienced between these two points. A wooded meadow, or flat, will occasionally relieve the tedious scrambling over the rocks. About two and one-half miles below Return Creek there is a large stream coming over the south wall in two splendid falls, each at least 400 feet high, and they may be much higher. A mile or a mile and a half further on, half-way down the cañon, just back of the south wall, there is a double-peaked rock of stupendous height, well named Tuolumne Castle.

The sheer-walled gorge is about four and one-half miles below Return Creek. It is the only impassable barrier in the cañon; and even here, when the water was very low, Mr. Muir found his way through. At this point, extending across the cañon at right angles, there is a high spur of rock, through which the water has found its way in a chasm between perpendicular walls. These walls of the gorge, after rising several hundred feet from the water, sweep back to the cañon walls, forming a ridge 1000 feet high, over which the traveler must climb. To realize thoroughly the impossibility of passing through the gorge, it is only necessary to climb out on a huge bowlder at its mouth, and take one glance at that roaring, rushing mass of

water. We named this gorge Muir Gorge, after Mr. John Muir, the first man to go through the cañon.

A few yards from the mouth of the gorge, blazes will be found leading 100 or 125 yards up the eastern side of the spur toward the north wall, and then gradually to the left up over the rock. At the highest point of the trail, in a small monument, we placed Sierra Club Canister No. 5. Leave the trail at this monument, and walk down the spur to the top of the sheer wall of the gorge (marked X on the sketch), where a view of almost



the entire gorge may be had. From the monument, the trail is indicated by blazes and piles of stones, leading down part way to a grove of cedars and pines, situated in a break in the walls of the gorge. Then climb gradually up, passing to the right of a small dome near the end of the gorge. From the pass on the right of this dome,

continue down close to its northwest cliff and towards the tributary which enters the cañon just below. Cross this tributary 100 or 150 yards from its confluence with the Tuolumne.

Words utterly fail to describe the sublimity of this part of the cañon. Looking east from a point just beyond the gorge there is a perfect amphitheater, through whose perpendicular walls there appears no way for the river to enter. On all sides these walls rise to such heights that the walls of Yosemite seem low in comparison. The tall conifers on their summits are scarcely noticeable.

Three miles below Muir Gorge there is a small valley devoid of meadow, but thickly timbered with cedars, pines, and oaks. In this valley there is a rocky spur jutting down to the river, which can be avoided by keeping close to the stream, unless the water is high, in which case it will have to be crossed some distance from the river. From this valley the river can be followed till another projecting spur is reached. Here the trail is indicated by blazes and piles of stones. The first blaze is on a large cedar near the water, and is followed by blazes on oak-trees, the direction being parallel with the river. Pait Valley is just beyond this spur of rock.

From Pait Valley to Hetch Hetchy Valley the way is rough and tedious. Good judgment will have to be used in crossing Cascade Creek near Pait Valley, and in working through thick brush and over the rocks. Three miles below Pait Valley there is another gorge. Blazes will be seen on a yellow pine near the entrance to this gorge, and succeeding blazes and stone-piles will be found leading, first, some 200 yards in an oblique direction toward the north wall; then for a short distance parallel with the river; and then gradually descending to two small oaks in a cleft of the rock. From these trees scramble down toward the river, and Hetch Hetchy will soon be reached.

Mr. J. N. Le Conte's new Sierra Club map of the Yosemite and Tuolumne regions (now in preparation) will plainly show the trails leading out of Hetch Hetchy Valley. It will also show a trail from Pait Valley to the Tioga road. The scenery of the cañon practically ends at Pait Valley; and if the party intends to return to the Tuolumne Meadows or to Yosemite, it is advisable, perhaps, to leave the cañon at this point and avoid a hard day's work to Hetch Hetchy, six miles further on. In this case, cross the river in the upper part of Pait Valley, where there should be found a large log lying across the stream, unless perchance recent freshets have swept it away. Follow then along the south bank to a spur of rock, over which it will be necessary to pass. Morrison Creek, coming over the south wall in a long series of cascades, enters the Tuolumne at the lower end of the valley. Cross the stream near its junction with the Tuolumne, and the trail will be found zig-zagging up its western bank.

It would be well to be met either in Hetch Hetchy or in Pait Valley by your pack-animals and outfit, in order to avoid short rations and the prolonged want of blankets.

NOTES ON THE PINE RIDGE TRAIL BETWEEN
SANGER AND THE SEQUOIA MILLS.

BY WARREN GREGORY.

That portion of the route from Fresno to the King's River Cañon which lies east of the Sequoia Mills has been thoroughly outlined in an itinerary written for the Club by Mr. Joseph N. Le Conte, and published in the Bulletin of January, 1894. It has also been graphically described by Mr. John Muir, in his article "A Rival of the Yosemite," published in the *Century* for November, 1891. Tourists whose time is limited may save three days by taking stage either from Sanger or from Visalia to the Sequoia Mills, and may there procure their outfit; but arrangements must be made some time in advance, if animals are wanted there.

Our party of four, consisting of Dr. Emmet Rixford, Mr. Loring Rixford, Mr. W. W. Sanderson, and the writer, left San Francisco on July 3, 1894, for a three weeks' tramp to the King's River Cañon. We procured our outfit at Sanger, fourteen miles east of Fresno, and we made the journey on foot, with a baggage-train of two "burros," obtained from "Bob" Cooper of Tremor. Acting upon a suggestion made to us at Sanger, instead of following the stage-road to the Mills, we took a trail further to the north, leading us along the crest of Pine Ridge. This trail proved to be so much pleasanter than the stage-road—which we tried on our return—that the following notes of it may be of service to others who make the trip.

From Sanger it is four miles by road to Centreville. In leaving this last town, care should be taken to cross under

the flume due east, following still the regular road, and crossing five bridges spanning as many forks of the river. This portion of the tramp should be taken early in the morning or in the evening, as it is quite warm and dusty. From the fifth bridge, continue one and a half miles south and then east to the schoolhouse on the right-hand side of the road. Here our route branched off from the stage-road (which continued due east) and took us north along a row of trees one mile to the dam of the '76 Canal ;



MAP OF PINE RIDGE TRAIL.

thence we followed up the east bank of the river one mile to Scroggins', on the right-hand side of the road. Up to this point we found the road excessively dusty, the sun broiling, and could make but little progress in the middle of the day. We, therefore, called a halt for some hours, and enjoyed a refreshing swim in the river. In the cool of the evening we continued on our way, turning to the east over a plateau and across a small grain-field, at the eastern boundary of which we again met the river at a distance of about one and a half miles from Scroggins'. We tramped until quite late in the evening, enjoying the many weird effects of the moonlight streaming through the trees and playing upon the waters of the river. We finally camped

near a deserted cabin about two miles from the wheat-field. The river is accessible at any point and fairly good camping places can be found *ad libitum*.

From this cabin the way begins to lose the semblance of a road, and turns into a trail. It follows the east and south banks of the river very closely for two miles; then it leaves the river, not to meet it again until the cañon is reached. Turning at this point sharply to the right, we crossed a steep ridge into the valley of Mill Creek, one mile distant. The cabin upon the left, some distance from the road, belongs to an Indian, Butler by name. From Butler's on, the question of water becomes important. Since Mill Creek, at this season of the year, is but a puny stream, with water of poor quality, it is advisable to fill the canteen before leaving the river. Continuing across Mill Creek, and bearing first east and then south, an ascent of about one and a half miles begins.

At a turn in the road on the left-hand side, one-half mile from the summit, is a spring where a good rest will be in order—for the next stage is a hard one. Continuing from the divide, we followed the road south one and a half miles to Humphrey's place, where we remained over night, enjoying to the utmost the delicious spring water found near a large fig-tree. It seemed a veritable land of milk and honey, after our hot and dusty tramp, and Mrs. Humphrey's cabbage will long be a happy memory to us all.

Starting early in the morning, a brisk walk of three miles over a hilly trail, brought us to Ingles' and Cooper's gate. About one hundred and fifty yards before reaching the gate the trail to White Deer begins. The tree standing at its entrance is blazed. Two of us had first gone down to Ingles' place in the valley, distant two miles, and found that from there a road led to White Deer, which could be reached by wagon. We returned, however, and took the

trail, in order to join our companions. Mr. Ingles usually is at Sanger, and, unless the detour is absolutely necessary, it will not be worth while to make it.

From the gate, the trail becomes quite steep. On the right-hand side, four miles from Humphrey's, at a deserted cabin, is a fine spring, where we halted and remained two hours. By leaving this spring not later than noon, Pine Ridge can easily be reached by night. It is two miles to White Deer, a small valley used for pasture by cattle-men. The house at the end of the trail belongs to Mr. Acres, and is near the foot of the grade. The creek, which has here become very small, should be crossed, and a sharp turn made to the left, following it and a brush fence about one-quarter of a mile; then turn to the south and follow the sheep trail, which is the beginning of the ascent to Pine Ridge.

Care should be taken to lay in a good supply of water for the long climb. About one mile up, at a dead log lying across the trail, and one hundred yards east from three dead pines, is a small spring, which is the last water to be found for many miles. It is advisable before beginning the ascent to locate these dead pine-trees, as they are easily discernible from the valley. From the spring to the top of the Ridge is about one mile; but the steep grade is forgotten in the delight occasioned by the first breath of the pines and by the wonderful panorama seen from the summit of the Ridge. The crest is here quite narrow, and the mountains to the north and east of King's River, the river itself, and the flume immediately below, stand out in bold relief. We turned sharply to the south and right. From this point on the crest of the Ridge should be followed as closely as possible until the Mills are reached. We had hoped to reach Sampson's mine, at which point we were told we could find water; but in the darkness we were unable to do so, and camped about four miles beyond the point where

we reached the crest of the Ridge. Next morning we discovered water in a small rivulet about two hundred yards to the right;—and very precious did we find it, for our canteen had given out the night before, and we had had no water for our animals. The glimmering lights seen below and to the southwest were in Dunlap, on the main stage-road.

Monday morning we continued along the road, which keeps a generally southeast direction, and about ten o'clock in the forenoon came to a place where the trail divided into three forks. The writer started on an exploring expedition; taking the left-hand trail and continuing down a very steep grade for about two and a half miles, came to a cabin which turned out to be the former abode of Evans and Sontag. The place was Sampson's Flat. One quarter of a mile beyond is Bigelow's cabin. The river, about fifteen miles away, can be reached from this point; but no road leads to the Mill, and it was found necessary to return. The right-hand trail leads to the Mill, *via* Jim Young's cabin, the scene of the bloody battle between Evans and Sontag and the officers. By this road it is six miles, three of which are on the main stage-road. The shortest and best route, however, is the middle trail, which follows the top of the Ridge, meeting the main stage-road about one mile above the Mill. Good water is to be found upon this trail, and the forests are interesting, although the devastating effects of the woodsman are plainly seen on every hand.

The trip from Sanger to the Mill, by this route, can be made without difficulty in three days. Upon our return our verdict was that we were well repaid for the hot, dusty work of the first twenty miles. It proved excellent training for our muscles, which the mountains afterward tested to the utmost, and was in every way a fitting prelude to the high Sierras.

THE KERN AND KING'S RIVER DIVIDE, AND MOUNT TYNDALL.

BY WARREN GREGORY.

The chief glory of the King's River Cañon is in the noble setting of lofty peaks which surround it. Within a radius of twenty miles from the valley there are many mountains which rise over thirteen thousand feet, and which can be reached by excursions of not more than four days' time.

Our party, having remained a few days in the valley, and having scaled the cliffs in the immediate vicinity, decided to make a more extended trip to the south and east, with Mount Tyndall as the objective point. Very little information could be obtained regarding our proposed route. The younger Mr. Fox, who was then in the valley, was familiar with the trail which led over Kearsarge Pass, *via* Lake Charlotte, but told us we should be obliged to rely upon our map and compass after leaving that trail.

No regular notes of this trip were taken, but in the hope that some future party from the Sierra Club may get more definite information regarding this route, I now give a few data concerning it, although I wish to say in advance that we were not positive that the peak we ascended was Tyndall, nor have we been able from subsequent observations to determine that fact. From all the details, however, which we have gathered, we know that it was either Tyndall or one of its near neighbors.

Leaving the log cabin in the upper end of the valley at eleven in the morning, we crossed King's River by the log bridge, our donkeys taking to the water without demur.

There is no well-beaten trail on the northern bank of the river; nevertheless, little difficulty will be found in reaching the head of the cañon, one and a half miles distant. There we crossed again to the south bank of the river, and, a little beyond, we forded Bubb's Creek, which comes tumbling down from the east in a fine series of cataracts. A person on foot, as we afterwards learned, need not cross the main river at all, but may keep on the southern bank all the way up to the ford of Bubb's Creek.

At one P. M. we commenced the ascent out of the main cañon. The trail has been blazed by sheepmen, and can easily be found; but it is very steep, and much the same in character as the trail leading out of the valley at the lower end. When once fairly in Bubb's Creek Cañon, the journey for about eight miles is not difficult, the trail continuing on the northern bank of the stream. The cañon is narrow, and the cliffs on either side very high, many of them more sheer than those in the lower cañon; in fact, our party agreed that the cliff effects here were equal, if not superior, to anything found below. Wood and water were in abundance, but the sheep had destroyed nearly every vestige of pasture. We can recommend any one to camp near the foot of the cañon, and spend some time in fishing, for the trout are plentiful, and bite with avidity. Picking our way among the boulders, and keeping as near the stream as possible, we came, at noon of the next day, to the head of the cañon. The trail to Kearsarge Pass and Independence continues up the defile to the east, from which a branch creek comes. We took the main stream coming in from the south, and started up a steep ascent. There is no defined trail, and we were obliged to trust entirely to our compass and to the animals, whose sagacity in picking available stepping-places over the tremendous boulders was marvelous. Few directions can be given as to route, other than to clamber up the best way you can. We found it

advisable to continue up the western bank of the stream; but at times were obliged to leave it at a considerable distance in order to get around the smooth, glacier-worn rocks which were impassable for our animals.

Two miles from the forks we had the first glimpse of the High Sierra; and, with the usual hope of the mountain climber, believed each new peak we saw to be Tyndall, although, as we subsequently found, it was not to be seen for many miles. A little further up, and through a narrow defile to the west, we recognized Mount Brewer, its snowy, fluted sides making it a landmark for all this region. We were at first tempted to try it; but as our original plan was to ascend a peak even nobler than Brewer, and as we knew Tyndall must be nearer east, we continued following the same stream as before. At its head, which we reached quite late in the evening, we found difficulty in traversing a great mass of bowlders; but we finally came out upon a lake a quarter of a mile in diameter, whose waters were fed by the snowbanks upon the other side. Near the upper end of this lake is a tamarack grove, in which we camped; and as, notwithstanding the season of the year, it was quite cold, an immense bonfire proved an acceptable adjunct. The Doctor, starting upon a reconnoitering expedition, and climbing up the cliff to the west, reported that there were peaks much higher to the east, and one especially, which seemed to keep the glow of the setting sun longest, he announced as Tyndall. Believing it near at hand, we started quite early next morning, crossing the creek, which had now dwindled into a tiny stream, and ascended half a mile through low brush. Thence we skirted around the base of the ridge, keeping well up until, arriving at an opening of what seemed to be a stream coming from the east, we began its ascent. It is probably three miles in length, and took us half a day to accomplish. We still had our animals, but the snowbanks and huge taluses on

either side rendered it well-nigh impassable for them, and we several times concluded that we were at the "head of navigation." About two in the afternoon we managed to push the donkeys into a small, crater-like amphitheater, in which the stream we were following had its source. It seemed, at first glance, to be inaccessible from every side except the one from which we came. Its walls were precipitous, and culminated in jagged peaks; and from every side descended huge triangular snowbanks, filling the amphitheater half-full of snow. Our animals could not go further, so we concluded to camp for the night. There was serious difficulty, however, about firewood, since the timber-line had been long since left behind. We did find, at last, one stray log, which must have been left by some wandering sheepherder. It was not necessary to picket our animals, as the only outlet was easily blocked by a rope stretched in front of the narrow entrance. Then the wind came up, and, blowing from the snow, was freezing cold; so, in order to keep our blood warm, we started upon an exploring expedition, climbing the sharp, jagged peak to the right, or south, of the crater. This and its companion still further to the south were the most sharply defined points we had seen. A stone can be thrown from one to the other, although the chasm between them must be thousands of feet in depth. We had no accurate data as to its height, but judged it to be over thirteen thousand feet. The ascent soon became very difficult, and we were obliged to trust to our hands entirely. Possibly three hours were consumed in reaching a small saddle in the cliff, about one thousand feet below the summit. This saddle was so narrow that we straddled it, and looked down on either side into profound depths. Across the small valley we could see that the peak to the east was still considerably higher, and concluded that was the mountain we were after. We did not, however, attempt its ascent that afternoon, but launched ourselves upon the first snow-bank

and so returned to camp. The only disagreeable effects of extreme altitude noticed by us so far were the results of this rapid descent. Constructing out of saddle-blankets a small "Digger" tent, we lay down for the night, but sleep was out of the question. Yet, the beauty of the little crater, as revealed by the full moon rising over the south wall, shining through the gaps between the needle-like peaks, and leaving long, slender shadows upon the snow, in some degree made us forget the extreme cold.

The south wall appeared lowest and most accessible. So, next morning we attempted to reach it by ascending the large snowbank on the south. As we neared the top, the surface became so smooth and icy that even crawling was out of the question. It required at least an hour's time to reach the nearest boulder on the edge of the snow, but a few feet away. These snowbanks are not to be trusted; for, although easily crossed below, they are hard and slippery above, and there is danger of being thrown on the rocks at the bottom. By crawling carefully along, we reached the wall, and found that it was of much greater height than we had supposed; but we were "in for it," and for two hours climbed, hand over hand, almost perpendicularly. Having no rope, we were obliged to trust to small crevices in the rocks for a foothold, and then, reaching up to some projection above, to clamber over as best we could. We were thankful when a narrow ledge enabled us to work around and reach the summit. This we found to be the divide between the Kern and King's Rivers. Its long, sloping surface to the south formed a sharp contrast to the sheer descent upon the north. Following along the crest due east, we had little difficulty in accomplishing the remaining two miles of the ascent. The summit has two prominent peaks, the one to the north being the higher, and to this we turned. At twelve o'clock we crawled up singly, and in turn stood upon the topmost

rock. We found it to be the culminating point of a narrow ridge which separated the hollow, or crater, out of which we had come from a similar one to the northeast. The sheer descent from this narrow summit upon three sides is the most tremendous that any of us had seen. Although we had had some experience with these high cliffs for days past, we found this at first to be too much for our nerves, and candor compels me to say that it was with no feelings of regret that I turned from this rock to the broader one immediately below.

I shall not dwell upon the view to be had from this mountain. We all agreed that it was the grandest and most extensive we had seen. Kern River Cañon lay almost directly to the south. The intervening plateaus were filled with small glacial lakes. Southeast, and about ten miles away, the helmet-like crest of Whitney seemed a little higher than we; and sixty degrees east of south loomed up a solid square mass we took to be Mt. Williamson, only a mile or two distant. Fifteen degrees east of north a round-shouldered mountain appeared, which we took to be Kearsarge Peak. Ten degrees west of north was a group of jagged peaks trending nearly east and west, which we thought might be the Lyell group. Nearer and more to the west the top of Glacier Point, overlooking the cañon of the King's, was recognized as an old friend. And still further west was Brewer, forming the north sentinel for the great western ridge. South of Brewer was the Kaweah group, and still further south Table Mountain, with its northern slope covered with snow.

Our uncertainty as to the identity of the peak on which we stood, lies in the fact that a peak to the east, somewhat nearer Williamson, was of about the same height. Whether this was Mt. Barnard or not, we are unable to say. Unquestionably, however, we were on the main crest of the Sierra.

Upon our return we found a more practicable trail, which had evidently been crossed by herders in going from Kern to King's River. At certain seasons of the year it may be possible to take animals over this trail to Kern River. We took the bearings of this trail, and now give them for the benefit of any one who may afterwards find himself in this lonesome spot. Near the entrance of the amphitheater there is a huge flat boulder. Standing upon it, the peak which we ascended lies fifteen degrees south of east, and is the largest and highest mountain seen in that neighborhood. The trail thither bears diagonally across the crater in a southeasterly direction, going to the south, or right, of the first lake, winding its way over the boulders, passing to the north of the second lake, and then turning to the right over taluses past two small lakes. Then turn up the narrow gorge, the lower end of which in July was covered with snow, and, by following it, the summit of the divide can be reached without much difficulty.

A SEARCH FOR A HIGH MOUNTAIN ROUTE
FROM THE YOSEMITE TO THE
KING'S RIVER CAÑON.

BY THEODORE S. SOLOMONS.

The writer and his companion, Mr. Leigh Bierce, had tramped it in the Sierra last summer, from the 20th of July. By way of hardening ourselves for the serious expedition we proposed later to take, we had made, among other trips, a descent of the Tuolumne Cañon, in the middle of August, photographing the principal scenery of that remarkable locality, and meeting with many experiences,—including a three days' fast,—which will serve to keep that little expedition almost as green in our memories as the one which forms the more especial subject of this article. Thoroughly equipped, we left the Yosemite on the 1st of September, bound for the King's River Cañon, *via* the High Sierra.

Two years previously, the writer had accomplished a portion of this journey. A description of the route followed was given in an article in the *Sierra Club Bulletin* of January, 1894. The writer led a mule from Mt. Lyell, past Mt. Ritter, and down the head-waters of the main San Joaquin to its junction with the South Fork, thence returning to Yosemite. It was our present intention to resume and complete this journey from the southernmost point attained on that trip, by continuing along the crest of the mountains—or, at least, sufficiently near the crest, to be still in the High Sierra—to the Great Cañon. We proposed to keep between the South Fork of the San Joaquin and the main crest, which run nearly parallel; then, if possible, to pass between the crest and Mt. Goddard; and finally to

descend the highest practicable fork of the King's to Tehipitee Valley, from which our destination, the larger cañon, is easily accessible. Such a high mountain route, practicable for animals, between the two greatest gorges of the Sierra, has never been found—nor, indeed, sought,—so far as my researches have revealed. The journey is usually made by crossing the mountains, either by the Mono or the Kearsarge Pass, and traveling across the hot and monotonous desert to the other pass. The trip has occasionally been made through the mountains—notably by a party among whom were John Muir and Galen Clark. Their route, however, avoided the High Sierra almost entirely.

After seeing the Yosemite, to enter the Californian Alps and to travel in them uninterruptedly to the grand gorge of the King's River would be a journey fit for the gods. As a scenic mountain tour, I doubt if the world affords its like. The Sierra Club member is sufficiently acquainted with our marvelous mountains to be able to picture to himself the glories of such a journey, and I need not therefore enlarge upon the subject.

The last fifty miles of this route, whatever may be the exact course of the zigzag to be worked out, must necessarily be extremely rough. One must travel right into the High Sierra before he can gain an adequate conception of its peculiarly rugged character. That portion in which head the several branches of the King's River and the South Fork of the San Joaquin, is the very climax of the Sierra in loftiness, in wildness, in desolation, in grandeur of view. Yet each rocky barrier has its vulnerable point, each pinnaled divide its cranny or gap through which the mule or jack may be led; and as travel in the Sierra becomes more general and popular, the route will be worked out, blazed, and mapped, and yearly traveled by the fortunate few, until its fame becomes world-wide.

To make the journey, a pack-animal is a necessity; for though there are probably few localities which offer any serious impediment to the passage of men, and a not too heavily laden pedestrian could make the trip very comfortably, the distance to be traversed is such that he could not possibly carry sufficient food to keep him strong enough to complete the journey. To go west to the forest settlements at intervals on the journey would hardly meet the difficulty; for the Pine Ridge stores, the only settlements which would be accessible to him, are fully seventy miles from the crest in any traversable line. It is an "animal route," therefore, which must be found before the average Sierra tramping will be likely to care to attempt the trip.

Our equipment was, I think, very complete, save that, at the last moment, we were obliged to substitute a small horse for the mule we had intended to take. The horse carried the boxes (improvements on those described in the previous article referred to), while the jacks, "Lyll" and "Kid," bore the reserve stock of supplies. The bulk of our provisions was purchased at Fish Camp and at the store of the Madera Flume and Trading Company, thus saving our animals thirty-five or forty miles of transportation from the valley. We amply provided against a possible six weeks' trip by taking over 200 pounds of food. Included in our outfit were a hand-shovel, small ax, fishing-rod, Winchester, 6½x8½ camera (with six plate-holders, case, tripod, and seven dozen glass plates), a few emergency remedies and surgical applications, tools, rivets, straps, and few clothes. Our saddles and packing paraphernalia were the best and strongest that are made, and our beds were eider-down, canvas-covered sleeping-bags that weighed next to nothing.

The route we followed to the southernmost point reached on my previous expedition is the same as that by which I then returned to the Yosemite, and it need not, therefore, be now described. We took the road to Wawona and to

Fish Camp, the trail to the Madera Flume and Trading Company's mills, and the Mammoth Trail to the Basaw Meadows, to the Chiquita Meadows, and to Jackass Creek, where, leaving that old and well-worn bridle-path, we struck south to the trail which Miller & Lux have built to their sheep-range, and followed it across Granite Creek to the main San Joaquin, about three miles beyond which is the Castle Meadow. Though it was quite dark when we approached them, I recognized the Meadows by a certain peculiar natural corridor cut through the basalt. At their upper end the ruddy blaze of a sheep-camp fire was a welcome sight to our tired animals and their hungry masters. Fresh mutton and mythical topography were our evening's entertainment.

The sheepman is at home in every part of the High Sierra in which he happens to have herded, but you cannot read his mental map. He is a good guide, but is nearly worthless in directing others. He will draw diagrams on the sooty bottom of the "fry-pan," which you must vow are lucid, though you know in your heart they are ridiculous. Moreover, the country immediately beyond the precise limits of his range is stranger to him than Afghanistan to a Bowery bootblack. Yet his contempt for your maps—though not altogether unjustified for other reasons than his—is as ill-concealed as it is profound. The nomenclature, too, of the mountains and rivers, changing with each new generation of herders, adds another element of confusion.*

The High Sierra, south of the section delineated by Mr. W. D. Johnson during the reconnoissance of the Mono Lake Basin some twelve years ago, is practically unmapped.

* The topographical information obtained during our journey will be embodied in the new edition of Mr. J. N. Le Conte's map, to be issued shortly. The only data used are such as we ourselves gathered along our actual route, and are therefore reliable. Much additional information was gained, which is probably accurate, but being unverified, has been excluded from the map.

Originally, the State Geological Survey, in 1865, made a hasty examination of a portion of it, and named a few peaks. Their map gives only a very general sketch of the topography, and is totally unreliable, where it is not, indeed, entirely wanting in detail. Subsequently the U. S. Land Office surveyors encroached upon the summit region here and there, but many of the township plats have been rejected for suspected fraudulent surveys, and the others are to be taken with many grains of allowance. Other than from these two sources, little data is to be had, the county maps adding nothing, and the Geological and Geodetic Surveys, whose atlas sheets are everywhere regarded as the most complete and reliable mountain guides, not yet having entered the region. This section of the Sierra is therefore a real *terra incognita*, save to the nomadic and ubiquitous sheep-herder. If it were magically scooped from its foundations and set down anywhere in Europe, it is safe to say that not two years would elapse before its every acre would be explored and mapped.

The vicinity of the junction of the south and main forks of the San Joaquin is, in some respects, a unique locality, and an interesting one from a scenic point of view especially. For several miles above their confluence both forks flow in narrow, notch-like gorges of bare and generally smooth granite, which at the junction of the streams unite to form a single similar gorge of considerable length. A mile or less in equidistance from the forks, and standing upon a pedestal of sloping glaciated granite, is the matchless Balloon Dome, reference to which was made in my previous article. From the sheep-camp a day's trip was taken to and around the dome, and to the "Notches," or river gorges, during which a number of negatives were secured, that, later, suffered the fate of all the other views taken during the trip.

The chief representative on the sheep-range of Miller &

Lux looked aghast when we told him our destination; and he warned us against the early snows, which were imminent. As a matter of fact, we had started rather late in the year, owing to delay in the Yosemite; but we determined to hazard the trip anyhow.

The route we selected led along what is called the "Upper Trail," which runs south-east and well away from the South Fork, to the end of the Miller & Lux range, which is some sixteen miles in length. Here intelligible trails ended, and we made our way around to Mono Creek, a large stream which rises on the main crest, flows south-west for about twenty miles, and empties into the South Fork. It was this creek that the old Geological Survey party descended, on re-entering the mountains from the Owen's Valley; and the Indian trail they followed is still used every summer by the few remaining Indians of Madera County.

It was while camped on the forest slope above Mono Creek, one beautiful evening, about two weeks after we started, that a singular adventure befell us. We had spread our canvas—our sleeping-bags thereon—about thirty feet from a dead, though standing, yellow pine of immense size, and had built our camp-fire of its fallen branches. We had spent the evening laughing inordinately at the caricatures in some humorous papers. In due course we went to sleep, those dreadfully funny periodicals still by our side.

In the dead of night I awoke with a strange sense of deadly fright. A crackling sound had aroused me, and my unconscious faculties interpreted it. The base of the dead tree had caught fire, and it was falling upon us. I yelled to Bierce as I stood up in the prison of my sleeping-bag, and had time to hop twice when the air quivered above me and a deafening crash chilled the blood in my veins. Something lightly touched my hair, and then there was

again the perfect stillness of the Sierra night, and a pitchy blackness reigned.

"Bierce," I shouted in dread.

"All right," was the cheery response, in a ringing voice; "and you?"

"You bet," I replied, getting bravely mundane in a moment.

Moving my head, I found the thing that had touched it was rigid. I put my hand up. It was a foot-thick branch of the fallen tree. A few inches from my side there was another branch, and between Bierce and myself, who were not more than six feet apart, there was another great limb; and Bierce was hemmed in by them, as was I. He had been similarly awakened by the warning crackle, but not taking time to rise, shrewd youth, had rolled in his bag about as far as I had hopped, or about six feet from where we had lain. Two feet back of us was the giant trunk lying across the canvas on which we had been sleeping. Stumps of its branches had pierced the canvas, and were deep in the earth. Seeking new lodgings, we finished our night's rest. In the morning the tree was merrily burning, telling us plainly that had we not perished at once on being struck by the trunk or impaled by its sharp limbs, a slow roasting to death would have been our fate. The branches of the fallen tree were so numerous that in no other positions so near the trunk, excepting the particular ones we had chanced to occupy when the monster fell, could two persons have been standing and not been struck. Of our many remarkable escapes during that summer, this must surely be reckoned as one peculiarly miraculous.

The middle portion of the creek flows through an extensive flat covered by a growth of tamarack and other trees, which give it a park-like appearance. This flat is at least five miles long by a mile in average width. From the color of its soil, we christened it Vermilion Valley.

From the high ground above Mono Creek we had carefully examined the country to the south-east, and had decided upon attempting the passage of what appeared to be a cut in a range of peaks which, though rugged and crest-like in character, we concluded was only the divide between tributaries of the South Fork, and must jut out from the main crest. This proved to be the case; for, upon crossing Mono Creek and ascending the divide—of which more anon,—we found ourselves overlooking Bear Creek, the southern ridge of which was our summit-like divide. At the head of the principal arm of Bear Creek was our gap, thenceforward to be our objective point.

The southern side of Vermilion Valley rises quite steeply for a few hundred yards, and is then rolling to the divide between Mono and Bear Creeks. It took us all of an afternoon to surmount this first acclivity. We led the animals a little at a time, each in turn. When nearly up, the "Kid" lost his footing in the loose, treacherous soil, and went literally heels over head, pack and all, down the hill, bouncing like a rubber ball from rock to tree, boxes of photographic plates the while whirling through the air; while the other jack brayed in sympathy and terror. The "Kid" finally brought up against a bank of chaparral, and in a moment we were at his side, certain he had been killed a dozen times,—jacks have more lives than cats,—and so he must be quite dead. Instead, we found him in a sitting posture, winking contemptively in the direction of the plains. Kneeling down, I reached my hand under his shaggy breast to the region of his heart. Heavens! it was thumping like a steam hammer. Though unhurt, the poor little fellow was evidently frightened almost to death. Singularly enough, none of the plates were broken,—a worse fate being in store for them.

Bear Creek rises on the main crest, not more than eight or ten miles north of the Palisades. Running at first

north-west, it curves gradually to the west and south-west, maintaining the latter course until it joins the South Fork five or six miles above the confluence of Mono Creek. About the head of these streams—especially of Bear Creek, since the latter is nearer to the divide between the two great rivers,—the crest region is truly sublime. Between their upper cañons there stands a castellated and pinnaced mass of pure white granite, like a colossal barbaric dagger, set deep in the rugged mountain, and piercing forever the indigo vault of the sky—a finer peak of its kind than any I had ever beheld, though much resembling the Castle Peak of the Tuolumne Sierra. Yet this magnificent pile is not within five miles of the true crest, whose peaks and those of the intervening territory are everywhere, if possible, richer and grander in sculpture.

Fine though it may be, the summit region of the Merced and Tuolumne Rivers is as much inferior to that of the King's and San Joaquin, as the former is superior to the low and rounded crests of the Sierra north of the Central Pacific Railroad. The crest region about the head of Bear Creek—or it would be more correct to say, the crest-like region—is a belt ten or fifteen miles wide, the outer half resembling the highest and finest peaks and divides of the Sierra east of the Yosemite, the inner, or true, crest resembling nothing that the writer's imagination had conceived.

The descent to Bear Creek was down a hill quite as trying as the ascent from Mono, and in accomplishing it, our little horse, a willing, plucky animal, broke his leg, and we had to shoot him and divide his load between the jacks, which then carried not more than 130 pounds apiece. We next ascended the upper course of the creek, the lower appearing to lie in an impassable gorge. As the creek turned south and approached our pass, its valley forcibly reminded us of that of the Lyell Fork of the Tuolumne, which is ascended by climbers of that peak. The upper

valley of Bear Creek is, however, much rougher, and having generally no grassy floor, is, rather, an open, rocky trough than a valley. Its glaciation is more striking than in any other similar locality I have ever examined. The ice seems to have melted only yesterday.

At a distance of perhaps ten miles from where we first struck the creek the valley ended and the stream forked, its larger branch coming through our pass—a term which we hasten to corrupt to “impass,”—the smaller draining a remarkable group of chains of lakelets which lay upon a number of terraces, or plateaus, to the south and west. The south wall of the gap we found to be the side of a peak, the eccentric shape of which is suggested in the name Seven Gables, which we hastened to fasten upon it—the second and last of our gratuitous christenings. We climbed the Seven Gables on the afternoon of our arrival at the head of the valley—September 20th. There was a dash of snow on its chimney-like pinnacle, which must be upwards of 13,600 feet above the sea.

When we gained the edge of the slanting, roof-like crest of the peak and looked out east, we both experienced a sensation that is hardly to be described, though it will be understood by those who have traveled in the Sierra or the Alps.

I was too awed to shout. The ideas represented by such words as lovely, beautiful, wild or terrible, cold or desolate, fail to compass it. Words are puny things, and the language of description quite as impotent as the painter's brush. Roughly speaking, one might say that the sight was sublime and awful. I can scarcely conceive of another scene combining the peculiar qualities of that view in a higher degree, and I believe I was then looking upon the finest portion of the crest of the Sierra Nevada Mountains—their scenic culmination, their final triumph. I am led to this belief by the fact that in extent of view, in general

topographical character, and in the shape and proportion of the dimensions of the objects constituting the view, no essential difference seemed to exist between the landscape before me and those pictured in photographs I had studied, taken from Mt. Whitney, Mt. Tyndall, and the vicinity of the Kearsarge Pass, which constitute the culmination of the range in altitude; while there was added an element of variety and contrast of form and color, due to the volcanic and other metamorphic masses which here are blended with the granite, and which quite disappear farther south.

We were standing on the very edge of a thousand-foot precipice that ran on south for some distance. Below were some frozen lakes in a bare, glacier-swept basin between our peak and those immediately beyond. Stretching north-east, perhaps five miles, and north-west and south-east as far as the eye could reach, there lay a territory of solid granite and darker-hued metamorphic rock, the surface of which was rent, upheaved, and disheveled into a bewildering confusion of peaks, walls, detritus-piles, pinnacles, and cliffs, massed and fairly crowding upon the view; and among them, like jewels, were patches of snow and cold lakes, like black-blue eyes, and here and there a little, gnarled tree, which was almost painful in the landscape, because of its suggestion of a nether world of things that live. Yet, in spite of that reminder, you may imagine your world dead, cold, turned to a moon, and nothing from pole to pole but those hard, frigid monuments watching the eternal sky, oblivious of all other existence. It seemed the very end of terrestrial sublimity.

Mt. Goddard was hidden by an intervening divide, but Mt. Gabb, Mt. Abbott, Mt. Humphreys, and Red Slate Peak were probably all in view, though we could not pick them out. I doubt if they will ever be identified among hundreds of equally prominent and striking crest-masses; and, for lack of adequate published description, the old

State Geological Survey will likely have named those four peaks in vain.

But the animal route! Well, our animals not being mythological beasts with wings, a glance sufficed to convince us that the Bear Creek divide was quite impassable. Yet, being within thirty miles, as the crow flies, of our destination, we determined to stick to our undertaking, and to dodge this ugly place by going a little farther from the crest and passing, if necessary, a little to the west of Mt. Goddard, which is the sentinel that guards the watershed between the two rivers.

I shall not have space to describe our movements during the next few days. Suffice it to say, that on the 28th day of September, after weathering several little flurries of snow, which were to be expected at that season of the year, and which therefore we did not seriously regard, we again found ourselves camped very near the Seven Gables. Not having been able to pass down the gorge of the lower Bear Creek, lack of provisions had forbidden any greater retrogression to a new starting-point, and we therefore determined to give our animals to a belated herder who was "feeding" up the creek, and to conclude the journey on foot, carrying our luggage on our backs. Experience in the Tuolumne Cañon had demonstrated that, hardened as we now were, we could carry fifty pounds and make good time; and allowing liberally for delays, we thought we could make the journey on the food we could carry, after subtracting from our combined capacity of 100 pounds the weight of camera outfit, blankets, and other absolutely necessary articles.

It snowed next day quite heavily as we neared the head of the valley, which was the place where we were to leave the jacks and strike out alone. Our fire-logs had to be pulled out of the snow, and, though we had no difficulty in maintaining a fire, the heat melted the steadily falling

flakes and soaked our sleeping-bags, so that we got almost no rest, and had to wait patiently for morning. The cheerless dawn came at last, and its gray light revealed to us a most alarming situation. From the edge of the melting circle of our fire out over the cañon, the surrounding crests, and as far as the vision extended — from horizon to horizon — Mother Earth was buried under nearly four feet of snow. Fully nine-tenths of it had fallen in the single night, and it was still falling. It enclosed us and our fire and the remnants of our outfit. We were on top of the Sierra, some seventy-five miles of nearly waist-deep snow between us and the nearest settlements. It was late in the year; the ground was cold; and, even assuming that no more snow would fall, fully two weeks must elapse before the mass already on the ground could melt. And then there would still be ahead of us the toilsome march across cañons and rivers to the lower mountains. On the whole, it was patent that our provisions were insufficient to warrant an attempt to weather the storm. How we hated to give in! But the silent, insidious enemy sifted deeper and deeper as we deliberated, and we surrendered to a cold and ominous necessity, and prepared to retreat. The "Kid" had strayed; "Lyell" we shot, to keep him from freezing or starving to death. Then we made up our packs, discarding everything we thought dispensable. When we struck out into the snow my camera-case and my companion's knapsack each weighed about eighteen pounds; and our sleeping-bags, wrung out as dry as we could get them, about twenty pounds each, or quadruple their weight when dry. After struggling through the drift about fifteen feet from camp, we stopped, obeying a common impulse, and looked at each other; and then, without a word, floundered back again to the smoldering logs. We were now fully alive to the gravity of the situation. It was a matter of life or death. Away went bedding; away went

camera and the precious negatives secured at the pains of so many hours of patient climbing; away—flung out upon the snow—went everything except half of a threadbare saddle-blanket apiece, absolutely necessary cooking utensils, and some twenty-five pounds of food. Thus lightened, we took our last leave of the remains of a once proud camping outfit,—I remember how yellow the flour looked against the absolute white of the snow—and struck out through the soft drifts.

Simply to walk was a complicated operation; for at every step the foot had to be raised clear of the snow before being reinserted, the body meanwhile precariously balanced on the other leg. We constantly ran foul of hidden snags, slipped from treacherous rock-surfaces concealed by the snow, and were tripped by logs too small to be indicated by long snow-mounds, as the larger ones were. Crystals showered down our necks as we jarred the laden trees; and often we could not see a hundred feet in front of us, and had to navigate by compass a creek-bottom, savagely rough and difficult to traverse when free of snow. The brawling stream had frozen over in the night; for the cold had been intense. It was yet snowing; our hands, though swathed in socks for mittens, were blue and stiff, and we had often to rest from the unwonted exertion of lifting at every step the weight of our legs, extra-weighted by the tenacious snow. We were sleepy; the hours went swiftly by, and our progress was alarmingly slow. Though we never lost hope,—if we had, we should have been incapable of the exertions we were making—yet when discussing our chances, we were forced to admit that they were no better than about even.

At noon we succeeded in clearing a space, lighting a fire, cooking some oatmeal and chocolate, and drying ourselves. This consumed two hours and a half. In the afternoon it ceased snowing. We climbed the north wall of

Bear Creek; and, as the dismal night closed threateningly around us, exhausted, cold, and dispirited, we stood in the snow prison that had clogged our limbs since early morning, and looked for the shelter and bed, by comparison with which all the things the great round world could then have offered us would have been contemptible. A big tree had fallen over two small bowlders, between which was a space only partly filled with snow. Bierce descried it; and we worked there till long past dark, scraping bare the ground of the cubby-hole, and roofing it with branches. Shelter we must have. As an effective preparation for slumber, we had previously found burrowing in the snow to be a delusion and a snare. The darkness deepened. Our shelter, when finished, was not snow-tight. Of the big pile of branches we had collected, little remained for firewood. My companion was taken with a severe chill, and I stood up, hour after hour, alternately warming the two rags of blankets, and making hot coffee. The night was freezing cold; the sky still ominous. Would it snow, or would it not? It was the critical hour of the whole adventure. At twelve o'clock, when nearly asleep, though still holding the blanket before the feeble blaze, I looked at the sky for the thousandth time, and thought I saw a star! I rubbed my grime-filled eyes. Yes, it was a star—three stars! As long as I live I shall never forget the shape of the triangle they formed. I shouted. Bierce and I watched that hole in the shroud of the sky. The three stars returned our steady gaze for a moment, then twinkled—twinkled alarmingly—and, finally, the shifting blackness blotted them cruelly out. But just then Bierce shouted, and pointed to the opposite portion of the sky. It was jeweled with stars! In ten minutes the whole firmament was lit with them. The storm was over.

Bierce's chill left him; we tore down the roof of branches, and converted it into fuel; we slept a little, and

rested until late in the morning; ate breakfast, and struck out for the South Fork in a glare of sunlight that was dazzlingly reflected from the snow. The great Sierra world was robed in virgin white. Never have I seen a sight so purely and transcendently beautiful. To feel one's self a mere animal, seeking warmth, food, and self-preservation; and suddenly, as upon that morning, to be confronted with a sight that touches to the quick the æsthetic nature, and thrills the immaterial soul within as it had never thrilled before—what a lesson in the duality of man!

The first day we had made perhaps five miles; the second, eight or ten; the third, we waded the icy current of the South Fork, and, climbing wearily up the other side, accomplished much less. By way of exercise, after our work of the day, each night we were compelled to devote two or three hours to collecting and arranging wood enough to keep us sufficiently warm to sleep. We had not a sufficiency of nitrogenous food to enable us to withstand these unusual inroads upon our strength, and on the fourth day we experienced the unique sensation of weakness without either sickness or particular fatigue. On the fifth we ran across a storm-bound sheep-herder; and mutton, in more than allopathic doses, restored us to full vigor. I venture to say that that sheep-herder had never got hold of more ostentatiously credulous listeners to his outrageous yarns. Generous with his edibles, superabundantly supplied with blankets, our pastoral Munchausen found us willingly—nay, anxiously—gullible; and in return for the contempt with which he doubtless contemplates our memory we continue to retain only the most innocent admiration, alike for his imagination and his mutton.

The next thirty miles was simply a run down the forests to the Pine Ridge settlements, on reaching which we learned that we had been overtaken by the most severe early storm that had ever occurred within the memory of

the oldest inhabitant. Our satisfaction over the incontestable fact that we were still living, was such as to prevent any vain regrets over failure and loss of outfit; and we jolted indolently down the Pine Ridge road on a lumber team, reaching Fresno on the 8th of October.

As soon as circumstances will permit, the writer intends to resume the search for a high mountain route from the Yosemite to the King's River Cañon.

TREASURER'S REPORT.

FROM MAY 15, 1894, TO MAY 15, 1895.

RECEIPTS.

Cash received from former Treasurer	\$806 45
Cash received from Secretary	716 92
Total	<u>\$1,523 37</u>

EXPENDITURES.

Telegrams	\$ 3 25
Stationery	3 10
Furniture	20 05
Stenographer	8 40
Stereopticon entertainment	27 10
Rent	135 00
Postage	33 54
Printing	497 05
Janitor	12 00
Office clerk	68 00
Registers and canvas covers	10 00
Making and repairing trails	200 00
Incidental	1 80
Total	<u>\$1,019 29</u>
Cash on hand, May 15, 1895	504 08
Total	<u>\$1,523 37</u>

WARREN OLNEY, JR.,
Asst. Treasurer.

SECRETARY'S REPORT.

FROM MAY 15, 1894, TO MAY 15, 1895.

In reviewing the work of the Sierra Club for the past year nothing remains to be reported to the members other than that already brought to their attention in the circulars that have been issued from time to time.

The interest taken by the members is manifest by the readiness with which the dues have been paid to the Secretary, and he is glad to report that already a large proportion of this year's dues has been paid.

From May 15, 1894, to May 15, 1895, the Secretary paid the Treasurer the sum of \$716.92, being the amount he has collected from the members for dues and initiation fees, and also from the sale of publications.

The utility of the maps published by the Club appears from the continued demand for the same, which, though small, is a constant one.

The public meeting of the Club held last fall was well attended, and showed the sympathy of quite a large number of the public in our work.

Of the Club's registers, which were prepared for last summer, there have been placed, on various peaks of the Sierra, at least six, which hereafter will be useful to all who may make the ascent. There remain six more at the disposal of the members for this season.

It is to be hoped that during the coming fall the kind offer of the Apalachian Mountain Club to allow us to exhibit their photographic views may be accepted, and that a public exhibition may be held.

Respectfully yours,

ELLIOTT McALLISTER,
Secretary of Sierra Club.



